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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/678,020	10/04/2000	Kiichiro Takahashi	1272.C0439	6101
5514 7590 11/14/2007 FITZPATRICK CELLA HARPER & SCINTO 30 ROCKEFELLER PLAZA NEW YORK, NY 10112			EXAMINER BRINICH, STEPHEN M	
			ART UNIT 2625	PAPER NUMBER
			MAIL DATE 11/14/2007	DELIVERY MODE PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

**Office Action Summary**

Application No.

09/678,020

Applicant(s)

TAKAHASHI ET AL.

Examiner

Stephen M. Brinich

Art Unit

2625

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 31 October 2007.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,7-12 and 18-22 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1,7-12 and 18-22 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>10/31/07</u> . | 6) <input type="checkbox"/> Other: _____  |

**DETAILED ACTION**

***Claim Rejections - 35 USC § 102***

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1, 7-9, 12, & 18-20 are rejected under 35

U.S.C. 102(b) as being anticipated by Takahashi (JP 04-033470 A).

Re claims 1, 9, 12, & 20, Takahashi discloses (Abstract) an image processing apparatus having printing means in which preestablished printing conditions (different types of recording media) are recognized. The apparatus judges which printing condition the printing means should perform when printing an output based on an image to be printed. The printing means performs density correction in accordance with the printing condition (the type of recording media used). Specifically, the printing means forms dots of different sizes (by ejecting controlled quantities of ink) in accordance with the image data (e.g. forming large dots of a given color in image regions of

that color), and corrects the dot size in accordance with the printing condition (type of recording medium).

Takahashi does not specifically describe the use of a retaining means for retaining density correction data for each of these printing conditions. However, Takahashi does state that the correction of the amount of ink ejected is changed in response to the identified recording medium. To perform this function as described inherently requires that the system retains the data necessary to associate a given recording medium with a specific amount of ink ejection amount correction.

Re claims 7 & 18, Takahashi discloses (Abstract) that the printing means has a plurality of printing elements (cyan, magenta, yellow, and black nozzles), each of which has an ink ejection amount corrected in this manner (which, as noted above, inherently requires the retention of correction data for each).

Re claims 8 & 19, as noted above, Takahashi discloses (Abstract) that the printing elements are cyan, magenta, yellow, and black nozzles. Each of these nozzles is inherently associated with the raster of pixels having that color.

***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

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(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 10-11 & 21-22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Takahashi in view of Applicant's described Prior Art.

Re claims 10 & 21, Takahashi does not specify the use of thermal energy as the ink ejection mechanism.

Applicant describes as known Prior Art (Specification, page 1, lines 24-27) printing mechanisms that perform ink ejection via thermal energy.

Takahashi and Applicant's described Prior Art are combinable because they are from ink printing.

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to use the Takahashi ink ejection amount control in a thermal energy inkjet printer.

The suggestion/motivation for doing so would have been to enable the contrast, sharpness, or coloring of a thermal energy inkjet printer to remain consistent across various recording media, as described by Takahashi (Abstract, final sentence).

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Therefore, it would have been obvious to combine Takahashi with Applicant's described Prior Art to obtain the invention as specified in claims 10 & 21.

Re claims 11 & 22, Takahashi does not describe simulating printing by the printing means in order to judge the printing condition.

Applicant describes as known Prior Art (Specification, page 4, line 26 - page 5, line 4) the printing of a test pattern (which simulates an actual printing run).

At the time of the invention, it would have been obvious to a person of ordinary skill in the art to use a test print to judge the corrections associated with printing conditions (different types of recording media).

The suggestion/motivation for doing so would have been to enable the accurate determination of what specific correction is required for each specific recording medium.

Therefore, it would have been obvious to combine Takahashi with Applicant's described Prior Art to obtain the invention as specified in claims 11 & 22.

#### **Conclusion**

5. Any inquiry concerning the contents of this communication or earlier communications from the examiner should be directed to Stephen M. Brinich at 571-272-7430.

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Any inquiry relating to the status of this application, entry of papers into this application, or other any inquiries of a general nature concerning application processing should be directed to the Tech Center 2600 Customer Service center at 571-272-2600 or to the USPTO Contact Center at 800-786-9199 or 571-272-1000.


The examiner can normally be reached on weekdays 8:00-5:30, alternate Fridays off.

The examiner's unit designation has been changed from "Art Unit 2624" to "Technology Division 2625" (as of March 20, 2006).

If attempts to contact the examiner and the Customer Service Center are unsuccessful, supervisor David Moore can be contacted at 571-272-7437.

Faxes pertaining to this application should be directed to the Tech Center 2600 official fax number, which is 571-273-8300.

Hand-carried correspondence may be delivered to the Customer Service Window, located at the Randolph Building, 401 Dulany Street, Alexandria, VA 22314.

  
Stephen M Brinich  
Examiner  
Technology Division 2625

smb  
November 9, 2007